

CITY COUNCIL AGENDA ITEM
CITY OF SHORELINE, WASHINGTON

AGENDA TITLE:	Authorize the City Manager or designee to sign the Seattle City Light Memorandum of Agreement for \$60,000 for the City Hall Solar Photovoltaic Project
DEPARTMENT:	Public Works
PRESENTED BY:	Jesus Sanchez, Operations Manager, and Rika Cecil, Environmental Programs Coordinator

PROBLEM/ISSUE STATEMENT:

To support the City's intent to be a full-scale example of sustainable living that demonstrates the value and importance of community renewable energy systems, Seattle City Light's Memorandum of Agreement (see Attachment A) provides \$60,000 to off-set the cost of the solar photovoltaic panels on the garage and the development of a long term educational program that includes student tours, the lobby kiosk with its interactive pages, and K-12 classroom activities that help students learn about their own personal choices related to energy conservation.

Seattle City Light's strong regional partnership with the City supports energy conservation and renewable energy production projects for Shoreline's residents, businesses and throughout the City Hall. The 17,592 kWhs generated by the solar panels as of October 4th provide cost savings for Shoreline, and the interactive kiosk in the lobby assists City Hall visitors to learn about and watch the live generation of electrical power by this exemplary renewable energy project.

FINANCIAL IMPACT:

\$60,000 is projected to be received as revenue in 2010 for the City Hall budget.

RECOMMENDATION

Staff recommends that Council authorize the City Manager or his designee to sign the Seattle City Light Memorandum of Agreement for \$60,000 in support of the solar photovoltaic project on the City Hall garage.

ATTACHMENT A: Seattle City Light Memorandum of Agreement

Approved By:

City Manager 

City Attorney 

Attachment A

MEMORANDUM OF AGREEMENT

For a Solar Demonstration Project

Between

The City of Shoreline

and

The City of Seattle, Seattle City Light Department

RECITALS

This Memorandum of Agreement ("Agreement") is between the City of Shoreline ("Shoreline"), located at 17500 Midvale Avenue N., Shoreline, WA 98133, and the City of Seattle, by and through its Seattle City Light Department ("SCL"), a municipal corporation located at 700 Fifth Avenue, Suite 3200, PO Box 34023, Seattle, WA 98124-4023.

In this document, Shoreline and SCL may be referred to individually as "Party" or collectively as "Parties."

This Agreement defines the terms, duties and miscellaneous provisions for the installation and ownership of a Solar Demonstration Project at Shoreline City Hall for the purpose of public demonstration and education. Funding by SCL is through the support of customers participating in SCL's voluntary Green Power Program.

This Agreement is effective upon execution of the Agreement by the Parties and for the duration of the Facility Owner Obligation Period.

Part 1. Definitions

- A. "Effective Date" means the date this Agreement is executed by the Parties.
- B. "Commercial Operation Date" means the date the PV System begins sustained production and delivery of energy following SCL signature and approval of an SCL Interconnection Application & Agreement, and following final PV System inspection, testing and acceptance by Shoreline.
- C. "Environmental Attributes" means any and all credits, benefits, emissions reductions, offsets, and allowances, howsoever entitled, resulting from the avoidance of the emission of any gas, chemical, or other substance to the air, soil, or water attributable to the PV System which are deemed of value by a Green Tag purchaser, and any credits or benefits for renewable resources. Environmental attributes include but are not limited to: (1) any avoided emissions of pollutants to the air, soil, or water such as (subject to the foregoing) sulfur oxides (SOx), nitrogen oxides (NOx), carbon monoxide (CO), and other pollutants; (2) any avoided emissions of carbon dioxide (CO2), methane (CH4), and other greenhouse gases (GHGs) that have been determined by the United Nations Intergovernmental Panel on Climate Change to contribute to the actual or potential threat of altering the Earth's climate by trapping heat in the atmosphere; and (3) the Green Tag Reporting Rights to these avoided emissions. Subject to the foregoing, Environmental

Attributes do not include any energy, capacity, reliability, or other power attributes from the PV System or any production tax credits associated with the construction or operation of the PV System.

- D. "Facility Owner" means the City of Shoreline. Also see Part 3 B.
- E. "Facility Owner Obligation Period" means the period of Shoreline's obligations and duties under this agreement. Such period extends for a term of ten (10) years from the Commercial Operation Date.
- F. "Green Tag" means the Environmental Attributes associated with the power generated from the PV System together with the Green Tag Reporting Rights associated thereto. Green Tag also includes any tradable or other credits for renewable resource generation attributable to the PV System, specifically including Renewable Energy Credits, and including without limitation any credits for meeting portfolio or other standards requiring renewable resource content now or in the future. Green Tags are accumulated on a kWh basis or equivalent basis and one Green Tag represents the Environmental Attributes associated with actual or deemed generation of one MWh of electricity generated by the PV System, or the claimed displacement of power.
- G. "Green Tag Reporting Rights" means the right of a Green Tag purchaser to report ownership of Green Tags in compliance with federal or state law, if applicable, and to a federal or state agency, or other parties at the Green Tag purchaser's discretion, and include those accruing under Section 1605(b) of the Energy Policy Act of 1992, any present or future renewable credit compliance requirements or program, or under any present or future domestic, international, or foreign emissions trading program.
- H. "PV System" means the 20.2 kW photovoltaic system located at Shoreline City Hall and as more completely described in Exhibit A attached hereto.

Part 2. SCL's Duties:

- A. **Funding:** SCL shall grant \$60,000 to Shoreline to offset a portion of the costs to Shoreline of installing a 20.2 kW PV System solar demonstration project, data monitoring system and interactive educational programming. SCL shall provide Shoreline with a Purchase Order number that shall be used to invoice SCL on or after the PV System Commercial Operation Date but not prior to execution of this Agreement. Payment is due 30 days after receipt of an invoice from Shoreline.
- B. **Green Power Program:** SCL shall include the PV System at Shoreline City Hall in its Green Power Program marketing and communication materials, and other information sources. Data monitoring of the PV System shall be publicly available on the SCL Green Power website and available to Shoreline for use on their website.

Part 3. Shoreline's Duties:

- A. **Installation:** Shoreline shall install a 20.2 kW PV System and related components, as further described in Exhibit A attached hereto, at Shoreline City Hall located at 17500 Midvale Avenue N., Shoreline, WA 98133.
- B. **Data Monitoring:** Shoreline shall install web based performance monitoring of the PV System including Fat Spaniel Technologies monitoring hardware, software and service license.
- C. **Ownership of the PV System:** Shoreline shall legally own the PV System and accepts all rights and responsibilities associated with ownership (as described in this Agreement).

- D. Ownership of Environmental Attributes:** During the Facility Owner Obligation Period, the Parties agree that all of the environmental attributes, also known as Green Tags or Renewable Energy Certificates ("RECs") associated with the operation of the PV System shall be retired on behalf of SCL Green Power Program customers. For the duration of the Facility Owner Obligation Period, Shoreline agrees to not sell, trade, assign, or transfer Green Tags or any portion thereof to any other party.
- E. Maintenance:** During the Facility Owner Obligation Period, Shoreline agrees to operate, maintain and/or repair the PV System in full compliance with both the manufacturers' and the installers' instructions so as to ensure all such warranties remain in full force and effect, and shall not sell, assign or transfer the PV System to another entity without the prior written consent of SCL.

During the Facility Owner Obligation Period, Shoreline will operate the PV System for the purpose of powering Shoreline City Hall electrical equipment loads at the PV System site.

Shoreline will be alerted via email if the PV system stops sending data for any reason. Shoreline is then responsible for making an attempt to identify the problem. Most often, any interruption in the data stream is caused by a malfunction in the data monitoring hardware or the data connection. Shoreline shall be responsible for contacting the data monitoring company, Fat Spaniel Technologies, at (408) 279-5262 for further troubleshooting and repair.

In the event the roof or any other portion of the physical structure supporting the PV System is repaired, replaced or otherwise modified during the Facility Owner Obligation Period, Shoreline is responsible for (i) having the PV system removed and reinstalled by a qualified photovoltaic repair technician and (ii) having the PV system returned to full Commercial Operation no later than sixty (60) days following completion of the roof or other repairs.

Shoreline will maintain the property where the PV System is located so as to not obstruct the PV System's access to sunlight thereby maintaining a solar envelope over the PV System, equivalent or substantially similar to that contained in the sun chart on record for the facility.

- F. Education Program Development:** Shoreline City Hall will serve as a full scale example of sustainable living that demonstrates the value and importance of community renewable energy systems.

Deliverable 1

Shoreline shall develop and implement a long-term program for renewable energy education and outreach, and agrees to designate an Education Outreach Program Lead, whose involvement will ensure the smooth identification and realization of educational programming.

Deliverable 2

At the end of each year, an Annual Progress Report will be submitted to SCL and will include at least the following information:

- a) any updates related to the Deliverables in the Agreement
- b) school and general community tour numbers, photos, etc.
- c) updates to project contact information, if necessary

Deliverable 3

With the assistance of SCL, by and through separate agreement with the Bonneville Education Foundation (BEF), the City will create up to 23 digital pages and install them in the lobby kiosk to educate the public about the City Hall's energy conservation and renewable energy production within the context of creating a sustainable community. Using the solar photovoltaic and solar thermal systems as examples, live solar production and related weather information will be viewed on the kiosk pages to invite community interaction and facilitate education. The

partnership between SCL and the City, as well as the City's commitment to sign a two-year agreement to purchase Green Power in addition to producing electricity through solar photovoltaic panels will be highlighted.

Deliverable 4

The Educational Outreach Program will include comprehensive signage, as well as guided tours focusing on sustainability through renewable energy production. The Education Outreach Program Lead will annually promote student tours of the facility to encourage energy conservation, support for renewable energy production and use of the BEF curriculum materials.

Deliverable 5

With the assistance of SCL, by and through BEF, the City will update as needed, curriculum materials for K-12 students to learn about the importance of renewable energy production and their own personal choices related to energy conservation.

- G. Project Documentation and Review:** After PV System installation, Shoreline will meet with the installation contractor to tour the site and review the following documents:
- A system Operations and Maintenance handbook.
 - A copy of all state and local notices verifying that each PV system passed all relevant inspections and requirements.
 - A copy of all warranties for all equipment and workmanship associated with installing each PV system.
- H. Access, Monitoring, and Reporting:** During project installation and throughout the Owner Obligation Period, Shoreline grants SCL access to the PV Systems, PV System sites, PV System meter(s), PV System utility account(s), energy usage data, and other relevant PV System monitoring data. Also, during the Facility Owner Obligation Period, upon reasonable request, Shoreline shall report requested PV System data to SCL.
- I. Taxes:** During the Facility Owner Obligation Period, Shoreline shall pay any and all federal, state, and/or local taxes associated with the PV System and/or the facilities or property upon which the PV Systems will be located.
- J. Public Relations Activities:** Shoreline shall work cooperatively with SCL to support public awareness and promotion of the PV System including press releases, press events, case studies, web identification, and other opportunities to highlight and promote the PV System. Shoreline shall credit the funding of the PV System and education program support by SCL, in any promotional materials it may develop during the Facility Owner Obligation Period.

Part 4. Miscellaneous Provisions

- A. Indemnification and Claims:** During the Facility Owner Obligation Period, Shoreline shall indemnify and defend SCL, and hold them harmless from and against any and all losses, liabilities, damages, claims, suits, actions, judgments, assessments, costs and expenses, including without limitation interest, penalties, attorney fees, any and all expenses incurred in investigating, preparing, or defending against any litigation, commenced or threatened, or any claim whatsoever, and any and all amounts paid in settlement of any claim or litigation asserted against, imposed on, or incurred or suffered by any of them, directly or indirectly, as a result of or arising from the negligent or wrongful acts or omissions of Shoreline.

Notwithstanding the previous paragraph, in no event shall any Party be liable to another Party for indirect, special, incidental, or consequential damages, including but not limited to the loss of revenues or profits, cost of substitute services, cost of purchased power, loss of opportunity, loss of goodwill, loss of data, governmental sanctions or penalties or claims of third parties, whether such liabilities arise as a result of breach of contract, warranty, indemnity, tort, negligence, strict

liability or otherwise; and the Parties hereby release each other from any such liabilities; provided that the foregoing limitations of liability and releases shall not apply to the extent any of the foregoing arises as a result of gross negligence, recklessness or willful misconduct.

- B. **Insurance:** Shoreline shall maintain "All Risk" property insurance covering the PV Systems at its full replacement value, at Shoreline's sole expense during the Facility Owner Obligation Period and during such period will immediately notify SCL of any substantial modification or cancellation of such insurance.
- C. **Governing Law:** This agreement shall be governed by the laws of the State of Washington.
- D. **Arbitration:** Any disputes which may arise under this Agreement and which can not be resolved by the Parties through good faith negotiation will be, in order to ensure rapid and economical resolution, submitted to final and binding arbitration in Portland, Oregon before Arbitration Service of Portland, Inc. ("ASP") according to its rules, provided, however, that (i) any dispute where the amount in controversy is less than \$50,000 will be resolved before a single arbitrator, and (ii) the Parties remain free to agree in connection with any particular dispute that they may arrange for arbitration outside of ASP.
- E. **Entire Agreement:** This Agreement, including all provisions, exhibits incorporated as part of this Agreement, and documents incorporated by reference, constitutes the entire agreement between the Parties. This Agreement supersedes all previous communications, representations, or contracts, either written or oral, which purport to describe or embody the subject matter of this Agreement.
- F. **Amendments:** No amendment, rescission, waiver, modification, or other change of this Agreement shall be of any force or effect unless set forth in a written instrument signed by authorized representatives of each Party.
- G. **Severability:** If any term of this Agreement is found to be invalid by a court of competent jurisdiction then such term shall remain in force to the maximum extent permitted by law. All other terms shall remain in force unless that term is determined not to be severable from all other provisions of this Agreement by such court.
- H. **Promotional Activities:** The Parties shall jointly approve in advance any promotional activities associated with the project, including but not limited to media events and the preparation of joint press releases.

Part 5. Signatures

The persons signing below represent that they are authorized to enter into this Agreement on behalf of the Party for whom they sign.

City of Shoreline

Seattle City Light

By: _____
(Signature)

By: _____
(Signature)

Name: Mark J. Relph

Name: Glenn Atwood

Title: Public Works Director

Title: Acting Director, Conservation Resources
Division

Date: _____

Date: _____

Shoreline Contact Information:	SCL Contact Information:
Jesus Sanchez	Jack Brautigam
Operations Manager	Renewable Energy Program Manager
City of Shoreline 17500 Midvale Avenue N. Shoreline, WA 98133	Seattle City Light PO Box 34023 Seattle, WA 98124-4023
206-801-2421	206-684-3954
jsanchez@shorelinewa.gov	jack.brautigam@seattle.gov

Exhibit A: PV System Description

The PV System shall be a 20.2 kW solar electric photovoltaic system located at Shoreline City Hall, 17500 Midvale Avenue N. The system shall be attached to the south facing wall of the garage structure and shall consist of the following hardware and equipment:

- (117) Silicon Energy 170 & 175 watt modules
- (2) Fronius IG Plus 10.0.1 inverters
- (2) Fronius RS-485 Communications Cards
- 1 – Locking DC Disconnect (not integrated with Inverter)
- 1 – Locking AC Disconnect (not integrated with Inverter)
- 1 – Wire and Conduit Package
- 1 – System/array grounding hardware
- 1 – Production meter base and SCL production meter
- 1 – Mounting support infrastructure
- 1 – Data Cable and Miscellaneous Connectors
- 1 – Fat Spaniel Technologies Inverter direct power monitoring and 1 year monitoring license

All other associated conduit, wires, fuses, disconnects, and equipment and hardware, conforming to specifications for a fully code-compliant system.

Labor costs associated with this project include:

- Permitting
- Racking - Installation of connectors (lag bolts, standoffs or C-Clamps) and Strut Racking
- Module Installation
- Module wiring and wiring fasteners
- Conduit installation and pulling DC wiring
- Roof or wall penetration for DC wiring (or AC wiring if inverter is installed exterior)
- Install mounting hardware for disconnects and inverter
- Mount disconnects and inverter
- Wiring connections (from modules to DC disconnect, to inverter, to AC disconnect)
- Conduit for AC wiring and pulling AC wiring
- AC inter-tie with building's existing electrical panel
- Pull communications wiring to computer or controller location
- System testing
- Labor costs will include time for initial site walkthrough and required inspection.